



Department:	Computer Science	
Year 7 Course summary:		
<p>Students will explore the core fundamentals of Computer Science and Computers, focusing on the nature and function of the CPU. They will develop their logic skills through the decomposition of simple problems. They will produce a range of plans using Flowcharts and pseudocode, before realising their solutions in Python. Students will discover the importance of computer based modelling and develop a complex spreadsheet model to investigate a real-world problem.</p> <p>Throughout the year students will discuss current issues in Computing including cybercrime, Artificial Intelligence, privacy and the environmental impact.</p>		
IST Assessments:		
Michaelmas	Lent	Summer
1. Computing fundamentals 2. Flowchart Programming	1. Python Programming 2. Spreadsheet Investigation	1. Turtle graphics 2. Ethics essay
Key vocabulary:		
Computing Algorithm Pseudocode Flowchart Decomposition Sequence Selection Iteration Input Processing Output	CPU FDE cycle RAM ASCII Clock speed Formula Cell reference Malware Data Protection	